IPD Viewer Software

User manual

AGFA

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Chapter 1

Introducing the IPD Viewer Software

This chapter covers the following topics:

- About the IPD Viewer Software
- IPD Viewer Software features
- Modes of the IPD Viewer Software
- Starting the IPD Viewer Software
- Using the online Help
- Switching between Selector mode and Viewer mode
- Quitting the IPD Viewer Software

About the IPD Viewer Software

The IPD Viewer Software is one of the major modules of the ADC Quality System.

The IPD Viewer Software User manual provides general and concise practical information on using the IPD Viewer Software. For full details on using the IPD Viewer Software, refer to the Reference manual or the online Help of the IPD Viewer Software.

IPD Viewer Software features

❖ *A number of features are only available with certain licences. Refer to the Licence document for more information.*

The IPD Viewer Software offers the following features:

- Searching for studies in the local database and in remote databases.

  The IPD Viewer Software allows you to specify a number of search criteria for searching the local database or remote databases. You can customize these searches to suit your specific needs, and store searches for future use.

- Viewing studies for on-screen diagnosis.

  Once you have retrieved a number of studies from the database, you can select a specific study and display it for on-screen diagnosis. You can customize the viewing environment according to your preferences.

- Interactively processing images and adding annotations.

  The IPD Viewer Software offers you an extensive range of image processing and diagnosis-assisting functions.

- Printing studies and images.

  Several printing options are available; you can choose between printing using the default layout, a non-default layout, or a custom layout.

Modes of the IPD Viewer Software

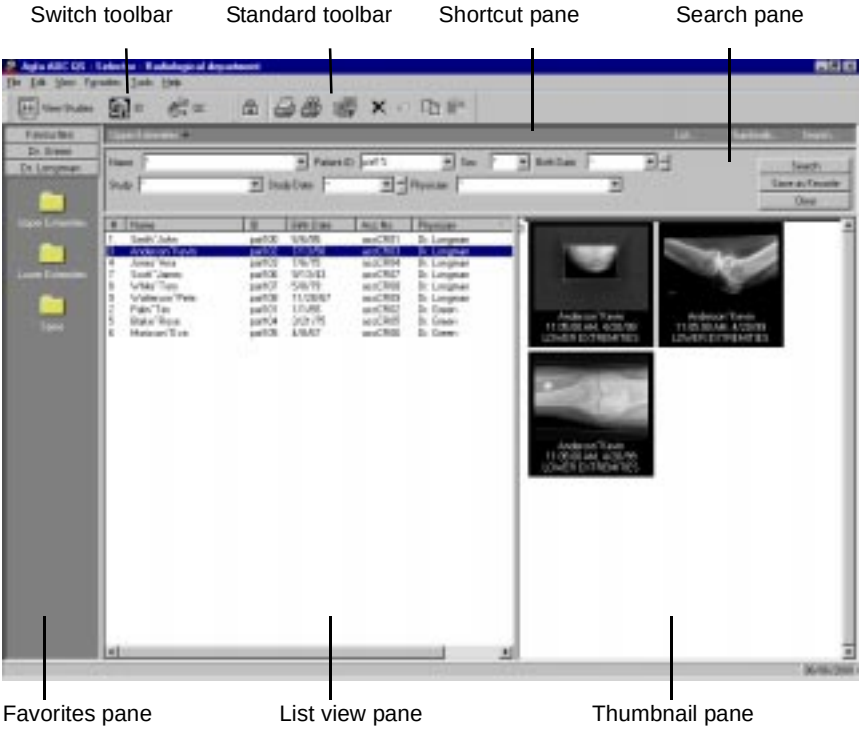
The IPD Viewer Software has two operating modes:

- The Selector mode.
- The Viewer mode.

You can seamlessly switch from Selector mode to Viewer mode and vice versa.

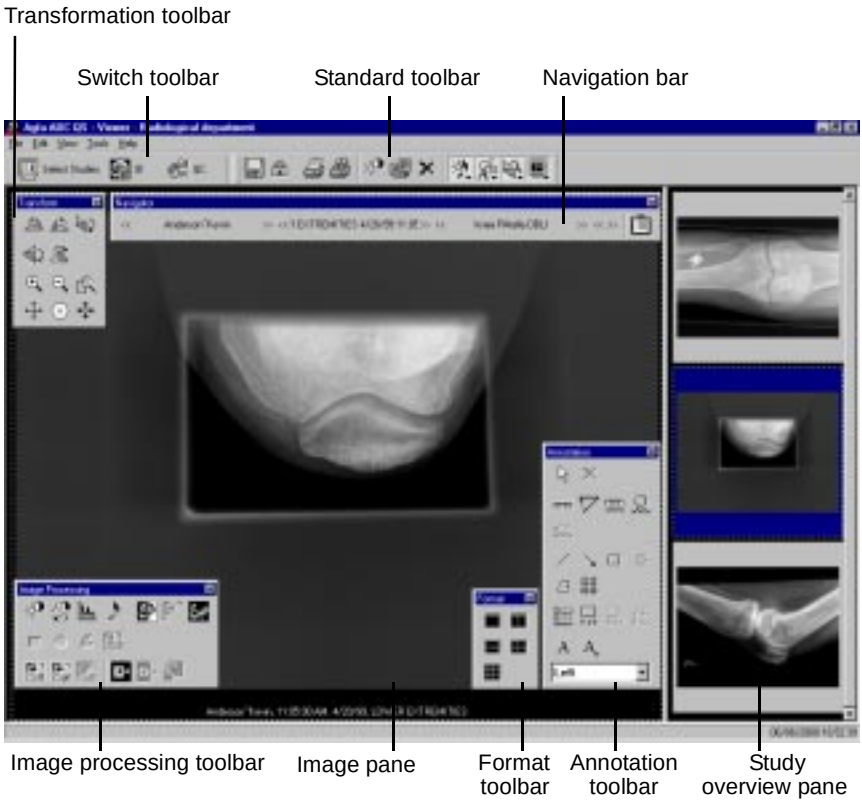
Selector mode

The Selector mode allows you to retrieve studies from the local database or from remote databases by means of search criteria. From the resulting list, you can subsequently select one or more studies.



Viewer mode

The Viewer mode allows you to view the studies which you have selected in Selector mode. The Viewer mode offers you a range of interactive image processing and diagnosis-assisting functions.



Starting the IPD Viewer Software

To start the IPD Viewer Software, you need a username and a password. Contact your system administrator. For information on creating users, refer to the Reference manual of the Configuration Viewer.

To start the IPD Viewer Software:

1 Do one of the following:

- Double-click the ADC QS icon.
- Click the Start button, and then point to Agfa. Point to the ADC QS folder, and then click Start ADC-QS.

The Login dialog box is displayed.

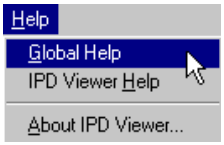
2 Type a valid username and password and click OK.

The ADC Quality System is started.

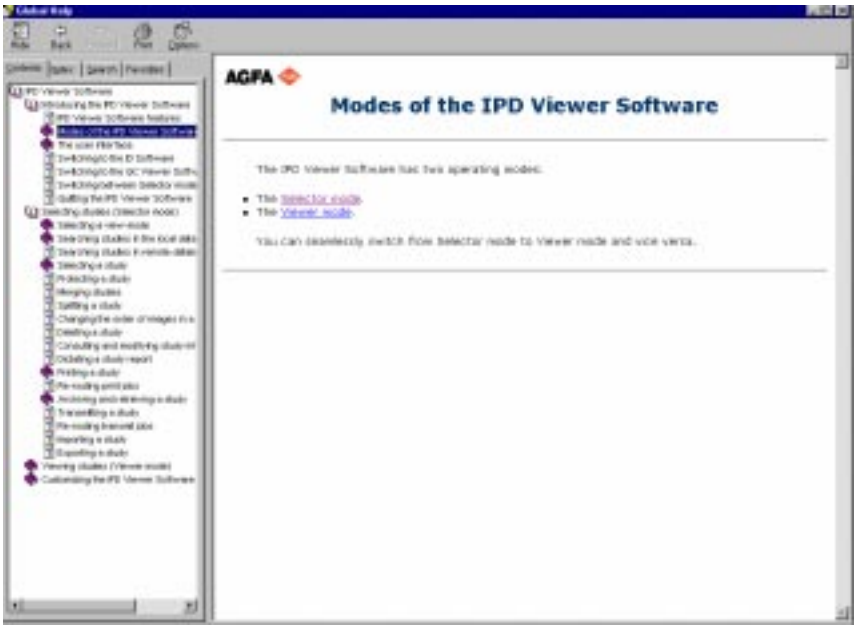
- If you start the ADC Quality System for the first time, the main window of the QC Viewer Software is displayed.
- If you have used the ADC Quality System before, the main window of the module which you used the previous time - either the ID Software, the QC Viewer Software, or the IPD Viewer Software - is displayed.

Using the online Help

You can invoke Help on the functions of the IPD Viewer Software via the Help menu. You can choose between Help on the IPD Viewer Software and Help on the global ADC Quality System (Global Help).



The online Help allows you to quickly and easily locate information; it has a table of contents, an index, a full-text search function, and a favorites function via which you can define favorite topics.



Online Help

Switching between Selector mode and Viewer mode

The **Selector mode** allows you to retrieve studies from the local database or from remote databases on the basis of search criteria. From the resulting list, you can subsequently select a number of studies.

Once you have selected studies, you can view them in **Viewer mode**. This mode offers you a range of interactive image processing and diagnosis-assisting functions.

To switch from Selector mode to Viewer mode:

1 In Selector mode, select one or more studies.

Refer to *'Selecting a study'* on page *21*.

2 To switch to Viewer mode, do one of the following:

- On the File menu, click View Studies.
- Click the View Studies button on the Switch toolbar.

If you have selected only one study, you can also do one of the following:

- Double-click the study in the list view pane.
- Double-click a thumbnail of the study in the thumbnail pane.

❖ *When you are working in Viewer mode, the navigation bar allows you to switch between the studies which you have selected in Selector mode. You do not need to return to Selector mode. For more information, refer to the IPD Viewer Software Reference manual.*

To switch from Viewer mode to Selector mode:

On the File menu, click Select.

Alternatively, you can click the Select Studies button on the Switch toolbar.

The IPD Viewer Software switches to Selector mode.

Quitting the IPD Viewer Software

Both in Selector mode and in Viewer mode, you can close the IPD Viewer Software.

If you have not saved changes to an image, save them before quitting. No warning message is displayed if you quit the IPD Viewer Software.

To quit the IPD Viewer Software:

1 If you have modified an image and you wish to save your changes, either replace the existing image or save the changed image as a new image.

To	Do this
Replace the existing image with the changed image	On the File menu, click Save. Alternatively, you can click the Save button on the Standard toolbar.
Save the changed image as a new image which is added to the study	On the File menu, click Save as New.

The image is stored in the local database.

2 On the File menu, click Exit.

The IPD Viewer Software is closed.

Chapter 2

Selecting studies (Selector mode)

This chapter covers the following topics:

- Searching the local database
- Searching remote databases
- Selecting a study or an image
- Protecting a study
- Transferring an image to another study
- Printing a study or an image

Searching the local database

To search for studies in the local database, you must specify a set of search criteria in the search pane in the Selector mode. The resulting set of studies will be displayed in the list view pane and the thumbnail pane.

To define a search:

1 Type or select for each search field a search criterion in the search pane.

Search pane

2 Click the Search button in the search pane.

If the list view pane is turned on, the resulting set of studies is displayed in the list view pane.

If the list view pane is turned off, the thumbnails of the resulting set of studies are displayed in the thumbnail pane. The studies are automatically selected.

➤ Once you have defined a search, you can save it for future use by saving it as a favorite. Refer to the Reference manual.

➤ Sets of favorites can be grouped according to a common characteristic. For more information, refer to the Reference manual.

Searching remote databases

Apart from searching the local database, you can search databases on remote volumes in the Selector mode.

Selecting a study or an image

Selecting a study is necessary when you wish to perform actions such as:

- Viewing a study for on-screen diagnosis.
- Printing a study.
- Transmitting a study to a DICOM review or archive station.
- Deleting a study.
- Consulting and modifying study information, etc.

In Selector mode, you can also select a single image. A limited number of actions are possible on an image basis:

- Deleting an image.
- Printing an image.
- Transmitting an image to a DICOM review or archive station.
- Exporting the image data to a Rislink file.

Selecting a study

The way you select studies depends on whether or not the list view pane is turned on.

- If the list view pane is turned on, you can either manually select studies via the list view pane, or you can work in automatic selection mode.
- If the list view pane is turned off, the studies which you retrieve from the database will be selected automatically.

To manually select one or more studies if the list view pane is turned on:

1 Define a search with the appropriate search criteria.

Refer to *'Searching the local database'* on page *18*. The resulting set of studies is displayed in the list view pane.

2 Select the studies:

To select	Do this
A single study	Click the study in the list view pane.
Multiple nonadjacent studies	Click a single study, and then hold down the CTRL key while you click other studies which you wish to select.
Multiple adjacent studies	Click a single study, and then hold down the SHIFT key while you click the last study of the range of studies which you wish to select.
All studies	On the Edit menu, click Select All.

Selected studies are highlighted in the list view pane. If the thumbnail pane is turned on, the thumbnails of the selected studies will be displayed in the thumbnail pane.

To automatically select studies if the list view pane is turned on:

1. On the Edit menu, click Auto Select All.

   A check mark means that automatic selection of search criteria is turned on.

2. Define a search with the appropriate search criteria.

   Refer to *'Searching the local database'* on page *18*. The resulting set of studies is displayed in the list view pane. All studies are automatically selected.

To automatically select studies if the list view pane is turned off:

1. Make sure that the thumbnail pane is turned on.

2. Define a search with the appropriate search criteria.

   Refer to *'Searching the local database'* on page *18*. The resulting set of studies is displayed in the list view pane. All studies are automatically selected.

Selecting an image

The way you select images depends on whether or not the list view pane is turned on.

- If the list view pane is turned on, first select the studies and then the images within the studies.
- If the list view pane is turned off, you can directly select the images via the thumbnail pane.

To select one or more images if the list view pane is turned on:

1 Make sure that the thumbnail pane is turned on.

2 Select the studies for which you wish to select images.

Refer to *'Selecting a study'* on page *21*.

3 Click the thumbnails of the images which you wish to select.

The thumbnails of selected images are highlighted in the thumbnail pane.

To deselect a selected image, click the thumbnail.

To select one or more images if the list view pane is turned off:

1 Make sure that the thumbnail pane is turned on.

2 Define a search with the appropriate search criteria.

Refer to *'Searching the local database'* on page *18*. The thumbnail images of the resulting set of studies are displayed in the thumbnail pane. All studies are automatically selected.

3 Click the thumbnails of the images which you wish to select.

The thumbnails of selected images are highlighted in the thumbnail pane.

To deselect a selected image, click the thumbnail.

Protecting a study

Studies are stored on the hard disk of the ADC QS Station. However, as the capacity of the hard disk is limited, only a certain number of studies can be stored. As the used space of the hard disk reaches the full capacity, the data of the oldest studies are automatically deleted and replaced with data from recent studies. You can, however, protect a study against automatic removal.

To protect one or more studies:

1 Select the studies which you wish to protect.

Refer to *'Selecting a study'* on page *21*.

To protect a range of studies, at least one study must be unprotected. A study is unprotected if the Protect button on the Standard toolbar is not pressed.

2 On the File menu, click Mark as Protected.

Alternatively, you can click the Protect button on the Standard toolbar.

The Protect button is pressed: the studies are protected.

❖ *If you select a range of studies for which at least one study has not been protected, the Protect button on the Standard toolbar will not be pressed, although other studies in the range may be protected.*

To remove the protection from one or more studies:

1 Select the protected studies from which you wish to remove the protection.

Refer to *'Selecting a study'* on page *21*.

To remove the protection from a range of studies, all studies must be protected. A study is protected if the Protect button on the Standard toolbar is pressed.

❖ *If you select a range of studies for which at least one study has not been protected, the Protect button on the Standard toolbar will not be pressed, although other studies in the range may be protected.*

2 On the File menu, click Mark as Protected.

Alternatively, you can click the Protect button on the Standard toolbar.

The Protect button is in its normal state: the studies are unprotected.

Transferring an image to another study

If an image is allocated in a wrong study, you can move the image to the correct study via image transfer.

To transfer an image to another study:

1 On the Tools menu, click Enable Image Transfer.

❖ *The transfer is only valid for 1 image, so you have to enable this function every time to use it.*

2 Go to the study folder with the image you wish to transfer.

Refer to *'Selecting a study or an image'* on page *20*.

3 Drag the image to the correct study folder and release it.

A pop up window will warn you that the image will be erased from the original study. Click OK if you want to confirm the transfer, or Cancel to leave the situation unchanged.

The image transfer is now complete.

Tips:

❖ *If an image is transferred out of a single image study then you will be left with an empty study. You can then delete the folder to remove it (refer to 'Deleting a study or an image' on page 61 of the Apparatus Reference manual.*

❖ *To create an new empty study folder to transfer an image to, identify a cassette (with the correct study information) an put it trough the digitizer.*

Printing a study or an image

In Selector mode you can print studies or single images according to your specific needs.

You can either:

- Print using the default layout via Quick Print.
- Print using a non-default or a custom layout via the Print Composer.

Print using the default layout (Quick Print)

Your ADC Quality System can be configured so that each study type is associated with a default printer and a default layout. If for a specific study type no default printer and/or default layout has been configured, the system default printer and/or layout will be considered to be the default.

To print using the default layout on the default printer:

1 Select the studies or images which you wish to print.

Refer to *'Selecting a study or an image'* on page *20*.

2 Click the Quick Print button on the Standard toolbar.

Depending on the configuration of your ADC Quality System, the studies or images will be printed on the configured or the system default printer using the configured or the system default layout.

Print using a custom layout (Print Composer)

Via the Print Composer, you can print on factory defined layouts or on previously saved custom layouts. You can print either a range of studies or a selection of images.

To print using a non-default or a custom layout:

1 Select the studies or images which you wish to print.

Refer to *'Selecting a study or an image'* on page *20*.

2 On the File menu, click Print Composer.

Alternatively, you can click the Print Composer button on the Standard toolbar.

The Print Composer main window is displayed.

If you have selected one or more studies, all images of the selected studies are displayed in the print preview.

If you have selected one or more images, all selected images are displayed in the print preview.

3 Set the print options such as the printer, the film format and the film layout.

Refer to the Reference manual of the Print Composer.

4 On the File menu of the Print Composer, click Print.

Alternatively, you can click the Print button on the toolbar of the Print Composer.

The Print dialog box is displayed.

5 Set the print options such as the film range and the number of copies.

Refer to the Reference manual of the Print Composer.

6 Click OK.

Chapter 3

Viewing studies (Viewer mode)

This chapter covers the following topics:

- ❑ Viewing a study for on-screen diagnosis
- ❑ Processing an image
- ❑ Transforming an image
- ❑ Adding annotations to an image
- ❑ Saving an image
- ❑ Printing a study

Viewing a study for on-screen diagnosis

The Viewer mode allows you to view studies and offers you a range of interactive image processing and diagnosis-assisting functions.

The most straightforward way to view a study in Viewer mode is to first select one or more studies in Selector mode and then switch to Viewer mode. All studies which you have selected in Selector mode will be available in the navigation bar in Viewer mode, allowing for easy navigation.

To view a study:

1 Select one or more studies in Selector mode.

Refer to *'Selecting a study'* on page *21*.

2 To switch to Viewer mode, do one of the following:

- On the File menu, click View Studies.
- Click the View Studies button on the Switch toolbar.

If you have selected only one study, you can also do one of the following:

- Double-click the study in the list view pane.
- Double-click a thumbnail of the study in the thumbnail pane.

All studies which you have selected in Selector mode are available in the navigation bar in Viewer mode. You can switch between the images of the study under examination or between studies.

3 To optimize the ADC QS Station for on-screen diagnosis, select an appropriate on-screen presentation.

Refer to the IPD Viewer Software Reference manual.

Processing an image

To process an image you can access the interactive image processing functions via the buttons on the Image Processing toolbar.

Image Processing toolbar

To	Use button(s)
Change the global contrast and intensity of an image (window/level)	
Revert to the original window/level	
Display the histogram and the sensitometric curve	
Change the study type related processing (basic MUSICA processing)	
Adjust the image processing parameters (advanced MUSICA processing)	and click Advanced.
Invert an image	

To	Use button(s)
Invert the saturated parts of an image (burn)	
Collimate an image manually (rectangular area)	
Collimate an image manually (circular area)	
Collimate an image manually (polygonal area)	
Collimate an image automatically	
Show/hide collimation	
Show/Hide collimation borders	
Apply shutters around a region of interest (ROI)	

For detailed information, refer to the IPD Viewer Software Reference manual.

Transforming an image

You can access the image transformation functions via the buttons on the Transformation toolbar.

Transformation toolbar

To	Use button
Rotate an image 90° clockwise	
Rotate an image 90° anti-clockwise	
Rotate an image 180°	
Flip around the horizontal axis	
Flip around the vertical axis	
Zoom in on an image	
Zoom out on an image	

To	Use button
Magnify part of an image	
Roam over a zoomed image	
Center the zoomed image in the image cell	
Revert to the full image	

For detailed information, refer to the IPD Viewer Software Reference manual.

Adding annotations to an image

You can access the annotation functions via the buttons on the Annotation toolbar.

Annotation toolbar

To	Use button
Select an annotation	
Delete an annotation	
Measure a distance	
Measure an angle	
Calibrate distance measurements via linear calibration	
Calibrate distance measurements via circular calibration	
Draw a line	
Draw an arrow	

To	Use button
Draw a rectangle	
Draw an ellipse	
Draw a polygon	
Show/Hide grid lines and define grid spacing	
Calculate a density profile	
Calculate the scan average level within a region of interest (ROI)	
Add custom text	
Set predefined text	
Add predefined text	

For detailed information, refer to the IPD Viewer Software Reference manual.

Saving an image

If you have modified an image via interactive image processing or transformation or have added annotations, and you wish to save these changes, save the image manually on disk.

To save an image:

1 Make the image the active image.

2 Perform any interactive processing or transformation operations and/or add annotations.

3 Save the image:

To	Do this	Button
Replace the existing image with the changed image	On the File menu, click Save. Alternatively, you can click the Save button on the Standard toolbar.	
Save the changed image as a new image which is added to the study	On the File menu, click Save as New.	–

The image is stored in the local database.

Printing a study

In Viewer mode you can print studies according to your specific needs.

You can either:

- Print using the default layout via Quick Print.
- Print using a non-default or a custom layout via the Print Composer.

Print using the default layout (Quick Print)

Your ADC Quality System can be configured so that each study type is associated with a default printer and a default layout. If for a specific study type no default printer and/or default layout has been configured, the system default printer and/or layout will be considered to be the default.

To print using the default layout on the default printer:

1 View the study which you wish to print.

Refer to *'Viewing a study for on-screen diagnosis'* on page *30*.

2 Click the Quick Print button on the Standard toolbar.

Depending on the configuration of your ADC Quality System, the studies or images will be printed on the configured or the system default printer using the configured or the system default layout.

➤ For information on configuring the printers of your ADC Quality System, refer to the Reference manual of the Configuration Viewer.

Print using a custom layout (Print Composer)

Via the Print Composer, you can print on factory defined layouts or on previously saved custom layouts. You can fully customize the layout of the images on the film.

➤ For information on defining custom layouts, refer to the Reference manual of the Print Composer.

To print using a non-default layout or a custom layout:

1 View the study which you wish to print.

Refer to *'Viewing a study for on-screen diagnosis'* on page *30*.

2 On the File menu, click Print Composer.

Alternatively, you can click the Print Composer button on the Standard toolbar.

The Print Composer main window is displayed.

All images of the study are displayed in the preview of the Print Composer.

3 Set the print options such as the printer, the film format and the film layout.

Refer to the Reference manual of the Print Composer.

4 If you wish to add images, drag them from the study overview pane or the image pane to the preview of the Print Composer.

To	Do this
Add an image to the preview of the Print Composer	Drag the image from the image pane or the study overview pane to the preview.

5 Removing images from the preview pane:

To	Do one of the following
Remove an image from the preview pane of the Print Composer	• Drag another image from the image pane or the study overview pane onto the image. • Right-click the image in the preview and then click Delete on the shortcut menu.

6 On the File menu of the Print Composer, click Print.

Alternatively, you can click the Print button on the toolbar of the Print Composer.

The Print dialog box is displayed.

7 Set the print options such as the film range and the number of copies.

Refer to the Reference manual of the Print Composer.

8 Click OK.

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